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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/665,564	09/22/2003	Louis R. Degenaro	YOR920030126US1	6151
MCGINN INTELLECTUAL PROPERTY LAW GROUP, PLLC 8321 OLD COURTHOUSE ROAD SUITE 200 VIENNA, VA 22182-3817			EXAMINER	
			SYED, FARHAN M	
			ART UNIT	PAPER NUMBER
			2165	
			MAIL DATE	DELIVERY MODE
			04/22/2011	PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

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# BEFORE THE BOARD OF PATENT APPEALS AND INTERFERENCES

Application Number: 10/665,564 Filing Date: September 22, 2003 Appellant(s): DEGENARO ET AL.

Sam S. Sahota (Reg. No. 47,051)

For Appellant

**EXAMINER'S ANSWER** 

This is in response to the appeal brief filed 04 April 2011 appealing from the Office action mailed 03 November 2010.

## (1) Real Party in Interest

The examiner has no comment on the statement, or lack of statement, identifying by name the real party in interest in the brief.

## (2) Related Appeals and Interferences

The examiner is not aware of any related appeals, interferences, or judicial proceedings which will directly affect or be directly affected by or have a bearing on the Board's decision in the pending appeal.

## (3) Status of Claims

The following is a list of claims that are rejected and pending in the application: claims 1-37

#### (4) Status of Amendments After Final

The examiner has no comment on the appellant's statement of the status of amendments after final rejection contained in the brief.

# (5) Summary of Claimed Subject Matter

The examiner has no comment on the summary of claimed subject matter contained in the brief.

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(6) Grounds of Rejection to be Reviewed on Appeal

The examiner has no comment on the appellant's statement of the grounds of rejection to be reviewed on appeal. Every ground of rejection set forth in the Office action from which the appeal is taken (as modified by any advisory actions) is being maintained by the examiner except for the grounds of rejection (if any) listed under the

subheading "WITHDRAWN REJECTIONS." New grounds of rejection (if any) are

provided under the subheading "NEW GROUNDS OF REJECTION."

(7) Claims Appendix

The examiner has no comment on the copy of the appealed claims contained in the Appendix to the appellant's brief.

(8) Evidence Relied Upon

2005/005261 SEVERIN 10-2005

(9) Grounds of Rejection

The following ground(s) of rejection are applicable to the appealed claims:

Claim Rejections - 35 USC § 102

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

2. Claims 1-37 are rejected under 35 U.S.C. 102(e) as being anticipated by Severin (U.S. 2005/0005261).

As per claims 1, 14, 27, 31, and 32, Severin teaches a method of claim 1 (Abstract), a system of claim 14 (Abstract), a system of claim 27 (abstract), a method of claim 31 (Abstract), and a computer-readable medium of claim 32 (Figure 5) of developing actual resources without alteration into a collection of virtual resources customized to a particular audience, said method comprising:

constructing at least one virtual resource independent of an actual resource (i.e. constructs a virtual model implementation. The Examiner notes that the virtual model includes a virtual resource, which is independent from an actual resource, where a virtual host includes a virtual resource.)(paragraph [0248; 0550]);

storing the virtual resource independent of an actual resource (i.e. virtual resources are stored in a database)(paragraphs [0248, 0437]);

connecting the actual resource to the at least one virtual resource (i.e. Component Integration Engine (CIE) are a logical grouping of resources (i.e. virtual resource) that is configured to shared resource (i.e. actual resource) at run-time)(paragraphs [0410-0413]);

retrieving the at least one virtual resource (i.e. retrieving data record stored in a virtual instance)(paragraph [0257]);

extracting at least one descriptor (i.e. descriptor contains the descriptions of features and functionality allowed and required in an implementation. It is a specific type of metadata)(paragraph [0049]) from said at least one retrieved virtual resource (i.e. Extract Transform Load tool provides the ability to extract data from a data source)(paragraph [0438]);

wherein said virtual resource comprises a resource utilized at a logic authoring time (i.e. virtual implementation using logic-based program.)(paragraphs [0079, 0250]) while said actual resource comprises a resource utilized at a runtime (i.e. run-time)(paragraphs [0411-0412]).

As per claim 2 teaches a method of claim 2 (Abstract) wherein said connecting comprises directly mapping the at least one actual resource to the at least one virtual resource (i.e. mapping the meta-implementation between a virtual resource and an actual resource)(paragraph [0079]), and

wherein the constructing the at least one virtual resource comprises including constraints upon the virtual resources without altering the actual resources (i.e. "...The model controller can be substituted without requiring any changes to the model, allowing complete reuse of a single property or a set of properties...")(page 23).

As per claims 3 and 16, Severin teaches a method of claim 3 (Abstract), a system of claim 16 (Abstract) wherein the constructing comprises at least one of: renaming a method (i.e. methods)(paragraph [0084]); hiding a method (paragraph [0084]); composing a method (paragraph [0084]); renaming an attribute (i.e. attribute)(paragraph [0084]); hiding an

attribute (paragraph [0084]); composing an attribute (paragraph [0084]); assigning to at least one domain (i.e. domains)(paragraph [0409]); designating as a collection; assigning to at least one validator (i.e. data validation)(paragraph [0089]); assigning a description (paragraph [0009]); designating as at least one of ready and not ready; and assigning a last modified date and time (paragraph [00410]).

As per claims 4, 8, 17 and 21, Severin teaches a method of claim 4 and 8 (Abstract), a system of claim 17 and 21 (Abstract), wherein said at least one virtual resource comprises a plurality of virtual resources and said virtual resources are connected to each other through a relationship carrying semantic that can be leveraged by a consumer of resources, said method further comprising:

constructing at least one virtual relationship between at least two virtual resources (i.e. constructs a virtual model implementation. The Examiner notes that the virtual model includes a virtual resource, which is independent from an actual resource, where a virtual host includes a virtual resource.)(paragraph [0248; 0550]);

coupling at least one actual relationship implementor to at least one virtual relationship;

performing at least one retrieval of a virtual relationship (i.e. retrieving data record stored in a virtual instance)(paragraph [0257]); and

extracting at least one descriptor (i.e. descriptor contains the descriptions of features and functionality allowed and required in an implementation. It is a specific type of metadata)(paragraph [0049]) from at least one retrieved virtual relationship (i.e. Extract Transform Load tool provides the ability to extract data from a data source)(paragraph [0438]).

As per claims 5, 18, and 22, Severin teaches a method of claim 5 (Abstract), a system of claim 18 and 22 (Abstract) wherein said coupling comprises: directly mapping said at least one actual relationship implementor to said at least one virtual relationship (paragraphs [0258, 0279, 0410]).

As per claims 6, 10 19, and 23, Severin teaches a method of claim 6 and 10 (Abstract), a system of claim 19 and 23 (Abstract) wherein the relationship constructing comprises at least one of: assigning a root virtual resource name; assigning a target virtual resource name; assigning a relationship name; assigning a relationship type; assigning a description; assigning a target instance naming scheme; designating as at least one of ready and not ready; and assigning a last modified date and time (The Examiner notes that the claimed limitations are an intended use of constructing and therefore are encompassed in the teachings of constructors.).

As per claims 7, 12, 20 and 25, Severin teaches a method of claim 7 and 12 (Abstract), a system of claim 20 and 25 (Abstract) wherein the retrieving comprises locating virtual relationships by at least one of: a domain; a name; a root; a type; and a target (The Examiner notes that the claimed limitations are an intended use leveraging virtual relationship and are encompassed in the teachings of virtual implementation.).

As per claim 9, Severin teaches the method wherein information constructing the at least one virtual resource includes data independent from the actual resource; the

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method further comprising: selectively manipulating the retrieved virtual resource by updating or deleting at least a portion of the retrieved virtual resource; and authoring the virtual resource into a logic code stored and executable by the computer to generate a second actual resource from the virtual resource (The Examiner notes that the claimed limitations are an intended use of constructing and therefore are encompassed in the teachings of constructors.).

As per claims 11 and 24, Severin teaches a method of claim 11 (Abstract), a system of claim 24 (Abstract) wherein the retrieving comprises locating virtual resources by at least one (i.e. mapping the meta-implementation between a virtual resource and an actual resource)(paragraph [0079]).

As per claims 13 and 26, Severin teaches a method of claim 13 (Abstract), a system of claim 26 (Abstract), wherein descriptor validator information is employed to limit actual resource usage (The Examiner notes that the claimed limitations are features that have been addressed in the independent claims and therefore addressed.).

As per claim 15, Severin teaches, a system of claim 15 (Abstract) wherein said connecting comprises directly mapping the at least one actual resource to the at least one virtual resource (i.e. mapping the meta-implementation between a virtual resource and an actual resource)(paragraph [0079]).

claims and therefore addressed.).

As per claim 28, Severin teaches a system further comprising: analyzing a requirement for actual resource usage, to provide said user requirements analysis (The Examiner notes that the claimed limitations are features that have been addressed in the independent

As per claim 29, Severin teaches a system further comprising: defining at least one virtual relationship between at least two virtual resources(i.e. mapping the meta-implementation between a virtual resource and an actual resource)(paragraph [0079]).

As per claim 30, Severin teaches a system wherein at least one of a virtual resource and a virtual relationship is utilized to create an application program (paragraphs [0410-0413]).

As per claim 33, Severin teaches a method of developing actual resources without alteration into a collection of virtual resources customized to a particular audience, said method comprising:

constructing at least one virtual resource independent of an actual resource (i.e. constructs a virtual model implementation. The Examiner notes that the virtual model includes a virtual resource, which is independent from an actual resource, where a virtual host includes a virtual resource.)(paragraph [0248; 0550]); and

providing in the at least one virtual resource a structured meta-data layer which contains semantic information for leveraging by a consumer of the virtual resources (i.e. Component Integration Engine (CIE) are a logical grouping of resources (i.e. virtual resource) that is configured to shared resource (i.e. actual resource) at run-time)(paragraphs [0410-0413]), wherein

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said virtual resource comprises a resource utilized at a logic authoring time (i.e. virtual implementation using logic-based program.)(paragraphs [0079, 0250]) and said actual resource comprises a resource utilized at a runtime (i.e. run-time)(paragraphs [0411-0412]).

As per claim 34, Severin teaches a method wherein said semantic information includes relationships with agreed upon semantics including any of "related-to," "contains," and "is-conflicting-with," between entities (The Examiner notes that the claimed limitations are an intended use of constructing and therefore are encompassed in the teachings of constructors.).

As per claim 35, Severin teaches a method wherein said semantic information allows any of making new resources manipulation operations available to logic authoring tools and services as an input to a conflict detection tool (The Examiner notes that the claimed limitations are an intended use of logic authoring tools.), and

wherein the a common layer is provided to resource utilizing tools comprising the logic authoring tool to directly access the virtual resource (i.e. "...The model controller can be substituted without requiring any changes to the model, allowing complete reuse of a single property or a set of properties...")(page 23).

As per claim 36 and 37, Severin teaches a method further comprising: creating at least one virtual resource instance (i.e. constructs a virtual model implementation. The Examiner notes that the virtual model includes a virtual resource, which is

independent from an actual resource, where a virtual host includes a virtual resource.)(paragraph [0248; 0550]);

assigning an identity to the at least one virtual resource instance (i.e. Component Integration Engine (CIE) are a logical grouping of resources (i.e. virtual resource) that is configured to shared resource (i.e. actual resource) at run-time) (paragraphs [0410-0413]); and

associating the at least one virtual resource instance with one virtual resource(paragraphs [0410-0413]).

## (10) Response to Argument

(1) Appellant notes that it does not appear that the disclosure in the publication document of Severin '261 is fully supported by the provisional application, Severin '251.

The Examiner disagrees. The non-provisional application is supported in its entirety by the provisional application Severin '251. According to *MPEP 307*, If an application which claims the earlier filing date of a provisional application includes only subject matter which formed a part of the provisional application, an assignment recorded against the provisional with be effective in the later application.

(2) Appellant notes that Severin '261 cannot be used as a reference since it has a later U.S. filing date than the present Application.

The Examiner disagrees. According to *MPEP 901.03*, a U.S. patent application publications are prior art under 35 U.S.C. 102(e) as of the *earliest effective U.S. filing date* of the published application. Ergo, the earliest effective filing date of Severin '261 is that of the provisional application filed July 2, 2003. The present application was filed 22

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September 2003 and therefore, Severin '261 serves as a bona fide prior art under 34 U.S.C. 102(e).

(3) The cited art does not teach or suggest constructing at least one virtual resource independent of an actual resource.

The Examiner disagrees. The cited art teaches constructing (i.e. constructs.)

Furthermore, the Examiner finds support for construction in the provisional application, see page 6, which defines a constructor as a set of programming logic associated with the creation of an instance. This concept is consistent with Appellant's disclosure, see page 14, lines 17-20, which describe constructing as to allow authoring of logic by a non-programmer or the like.)(paragraph [0248]) at least one virtual resource independent ( a virtual model implementation. In addition, the Examiner finds support for a virtual model implementation as a model controller on page 24 of the provisional application. The Examiner notes that in Appellant's disclosure, see page 14, lines 22-25, resources are a loose term which in this context means data (e.g., databases, objects, attributes, etc.) or function (e.g. SQL queries, object method calls, etc.. Based on this rationale, Severin discloses virtual implementation refers to assemblies of meta-implementation (including other virtual implementation for a specific descriptor), where virtual implementation may use a plain object oriented implementation.)(Paragraphs [0078, 0196, 0248]) of an actual resource (i.e. Severin discloses that during real implementation, or at run-time virtual resources are assigned to each descriptor. The Examiner finds support for actual resource in the view controller of the provisional application, see page 25.)(paragraph [0198, 0248, 0550]).

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(4) The cited art does not teach or suggest connecting the actual resource to the at least one virtual resource.

The Examiner disagrees. The cited art teaches connecting (i.e. Severin discloses creating connection between objects (e.g. virtual and actual) dynamically at run-time.)(paragraph [0523]) the actual resource to the at least one virtual resource (i.e. virtual resources are stored in a database. The Examiner finds support in the Provisional Application, see page 23, second paragraph, 'interaction between components...")(paragraphs [0248, 0437]).

(5) The cited art does not teach or suggest extracting at least one descriptor from said at least one retrieved virtual resource, wherein said virtual resource comprises a resource utilized at a logic authoring time, while said actual resource comprises a resource utilized at a run time.

The Examiner disagrees. The cited art teaches extracting at least one descriptor from said at least one retrieved virtual resource (i.e. descriptor contains the descriptions of features and functionality allowed and required in an implementation. It is a specific type of metadata)(paragraph [0049]), wherein said virtual resource comprises a resource utilized at a logic authoring time (i.e. virtual implementation using logic-based program.)(paragraphs [0079, 0250]), while said actual resource comprises a resource utilized at a runtime (i.e. Severin discloses that at run time model substitution, object substitution, functional substitution, and data substitution occurs at run-time. The Examiner also finds support for runtime in the Provisional Application, see at least pages 20-21.)(paragraphs [0089-0092, 0411-0412, 0523]).

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# (11) Related Proceeding(s) Appendix

No decision rendered by a court or the Board is identified by the examiner in the Related Appeals and Interferences section of this examiner's answer.

For the above reasons, it is believed that the rejections should be sustained.

Respectfully submitted,

/Farhan M Syed/ Examiner, Art Unit 2165 April 18, 2011

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